

CLAIMS

We claim:

1. A method of PDT treatment of cardiovascular indications associated with occlusions of a blood vessel comprising the steps of:

5 administering a photosensitizer drug other than psoralen compounds; and
delivering an intravascular photoactivating light to the blood vessel at an activation wavelength within the range of about 390 to about 610 nm such that the molar extinction coefficient of the photosensitizer drug at the activation wavelength is at least $1000 \text{ L cm}^{-1} \text{ M}^{-1}$.

10 2. The method of claim 1 wherein the photosensitizer drug is texaphryn or a derivative thereof.

3. The method of claim 2 wherein the photosensitizer drug is lutetium texaphryn.

4. The method of claim 3 wherein the light is delivered at an activation wavelength within the range of about 457 to about 458 nm.

15 5. The method of claim 1 wherein the photosensitizer drug is benzoporphyrin or a derivative thereof.

6. The method of claim 5 wherein the light is delivered at an activation wavelength within the range of about 457 to about 458 nm.

7. The method of claim 5 wherein the photosensitizer drug is Bisudyne.

20 8. The method of claim 1 wherein the photosensitizer drug is xanthene or a derivative thereof.

9. The method of claim 8 wherein the photosensitizer drug is Rose Bengal or a derivative thereof.

10. The method of claim 1 wherein the photosensitizer drug is azoporphyrin or a derivative thereof.

11. The method of claim 1 wherein the photosensitizer drug is phthalocyanine or a derivative thereof.

5 12. The method of claim 1 wherein the photosensitizer drug is a naturally occurring or synthetic porphyrin or a derivative thereof.

13. The method of claim 1 wherein the photosensitizer drug is pupurin or a derivative thereof.

10 14. The method of claim 1 wherein the photosensitizer drug is a naturally occurring or synthetic chlorin or a derivative thereof.

15 15. The method of claim 1 wherein the photosensitizer drug is porphycyanine or a derivative thereof.

16. The method of claim 1 wherein the photosensitizer drug is isomeric porphyrin or a derivative thereof.

15 17. The method of claim 1 wherein the photosensitizer drug is pentaphyrin or a derivative thereof.

18. The method of claim 1 wherein the photosensitizer drug is sapphyrin or a derivative thereof.

20 19. The method of claim 1 wherein the photosensitizer drug is phlorin or a derivative thereof.

20. The method of claim 1 wherein the photosensitizer drug is a naturally occurring or synthetic bacteriochlorin or a derivative thereof.

21. The method of claim 1 wherein the photosensitizer drug is benzochlorin or a derivative thereof.

22. The method of claim 1 wherein the photosensitizer drug is hypericin or a derivative thereof.

5 23. The method of claim 1 wherein the photosensitizer drug is anthraquinone or a derivative thereof.

24. The method of claim 1 wherein the photosensitizer drug is rhodanol or a derivative thereof.

25. The method of claim 1 wherein the photosensitizer drug is barbituric acid dye or a derivative thereof.

26. The method of claim 1 wherein the photosensitizer drug is an expanded porphyrin or a derivative thereof.

27. The method of claim 1 wherein the photosensitizer drug is dipyrromethene or a derivative thereof.

15 28. The method of claim 1 wherein the photosensitizer drug is coumarin or a derivative thereof.

29. The method of claim 1 wherein the photosensitizer drug is azo dye or a derivative thereof.

30. The method of claim 1 wherein the photosensitizer drug is acridine or a derivative thereof.

20 31. The method of claim 1 wherein the photosensitizer drug is rhodanine dye or a derivative thereof.

32. The method of claim 1 wherein the photosensitizer drug is azine dye or a derivative thereof.

33. The method of claim 1 wherein the photosensitizer drug is tetrazolium dye or a derivative thereof.

5 34. The method of claim 1 wherein the photosensitizer drug is safranine or a derivative thereof.

35. The method of claim 1 wherein the photosensitizer drug is indocyanine or a derivative thereof.

36. The method of claim 1 wherein the photosensitizer drug is indigo dye or a derivative thereof.

37. The method of claim 1 wherein the photosensitizer drug is triazine dye or a derivative thereof.

38. The method of claim 1 wherein the photosensitizer drug is pyrrole derived macrocyclic compound or a derivative thereof.

15 39. The method of claim 1 wherein the photosensitizer drug is isobacteriochlorin or a derivative thereof.

40. The method of claim 1 wherein the photosensitizer drug is naphthalocyanine or a derivative thereof.

41. The method of claim 1 wherein the photosensitizer drug is phenoxazine or a derivative thereof.

20 42. The method of claim 1 wherein the photosensitizer drug is phenothiazine or a derivative thereof.

43. The method of claim 1 wherein the photosensitizer drug is chaloorganapyrylium or a derivative thereof.

44. The method of claim 1 wherein the photosensitizer drug is triarylmethane or a derivative thereof.

5 45. The method of claim 1 wherein the photosensitizer drug is rhodamine or a derivative thereof.

46. The method of claim 1 wherein the photosensitizer drug is fluorescein or a derivative thereof.

47. The method of claim 1 wherein the photosensitizer drug is verdin or a derivative thereof.

48. The method of claim 1 wherein the photosensitizer drug is toudine blue dye or a derivative thereof.

49. The method of claim 1 wherein the photosensitizer drug is methylene blue dye or a derivative thereof.

15 50. The method of claim 1 wherein the photosensitizer drug is methylene violet or a derivative thereof.

51. The method of claim 1 wherein the photosensitizer drug is nile blue dye or a derivative thereof.

20 52. The method of claim 1 wherein the photosensitizer drug is nile red or a derivative thereof.

53. The method of claim 1 wherein the photosensitizer drug is phenazine or a derivative thereof.

54. The method of claim 1 wherein the photosensitizer drug is pinacyanol or a derivative thereof.

55. The method of claim 1 wherein the photosensitizer drug is a plasmocorinth or a derivative thereof.

5 56. The method of claim 1 wherein the photosensitizer drug is indigo or a derivative thereof.

57. A method of PDT treatment of cardiovascular indications associated with occlusions of a blood vessel comprising the steps of:

administering a photosensitizer drug;

delivering a photoactivating light to the blood vessel with an intravascular light

delivering device at an activation wavelength within the range of about 440 to about 610 nm such that the molar extinction coefficient of said drug at the activation wavelength is at least 1000 L cm⁻¹ M⁻¹.